



ABSTRACT OF THE DISCLOSURE

A flip-flop circuit has a first switching element having a first terminal connected to data input terminal, a second terminal, and a first gate. A second switching element has a first terminal connected to an output terminal of a first inverter element, a second terminal, and a second gate. A second inverter element has an input terminal connected to the second terminal of the second switching element and a data output terminal. The flip-flop circuit is initialized by inputting two control signals to the first and second gates of the first and second switching elements, respectively, to simultaneously activate the first and second switching elements. The flip-flop circuit is activated by inputting the two control signals to the first and second gates of the first and second switching elements, respectively, to alternately activate the first and second switching elements.